



UNITED STATES PATENT AND TRADEMARK OFFICE

UNITED STATES DEPARTMENT OF COMMERCE
United States Patent and Trademark Office
Address: COMMISSIONER FOR PATENTS
P.O. Box 1450
Alexandria, Virginia 22313-1450
www.uspto.gov

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/022,301	12/17/2001	Lisa McKerracher	12552-003001/06447-002-US	1730
26211	7590	11/04/2003	EXAMINER	
FISH & RICHARDSON P.C.			TURNER, SHARON L	
45 ROCKEFELLER PLAZA, SUITE 2800			ART UNIT	
NEW YORK, NY 10111			PAPER NUMBER	

1647

DATE MAILED: 11/04/2003

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary	Application No. 10/022,301	Applicant(s) MCKERRACHER ET AL.	
	Examiner Sharon L. Turner	Art Unit 1647	

-- The MAILING DATE of this communication appears on the cover sheet with the corresponding address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 1 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133).
- Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 17 December 2001.
- 2a) ☐ This action is **FINAL**. 2b) ☐ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-21 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☐ Claim(s) _____ is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☒ Claim(s) 1-21 are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on _____ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
- 11) ☐ The proposed drawing correction filed on _____ is: a) ☐ approved b) ☐ disapproved by the Examiner.
If approved, corrected drawings are required in reply to this Office action.
- 12) ☐ The oath or declaration is objected to by the Examiner.

Priority under 35 U.S.C. §§ 119 and 120

- 13) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
a) ☐ All b) ☐ Some * c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. _____.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
* See the attached detailed Office action for a list of the certified copies not received.
- 14) ☐ Acknowledgment is made of a claim for domestic priority under 35 U.S.C. § 119(e) (to a provisional application).
a) ☐ The translation of the foreign language provisional application has been received.
- 15) ☐ Acknowledgment is made of a claim for domestic priority under 35 U.S.C. §§ 120 and/or 121.

Attachment(s)

- | | |
|--|---|
| 1) <input type="checkbox"/> Notice of References Cited (PTO-892) | 4) <input type="checkbox"/> Interview Summary (PTO-413) Paper No(s). _____ |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948) | 5) <input type="checkbox"/> Notice of Informal Patent Application (PTO-152) |
| 3) <input type="checkbox"/> Information Disclosure Statement(s) (PTO-1449) Paper No(s) _____ | 6) <input type="checkbox"/> Other: _____ |

Election/Restriction

1. Claims 1-21 are pending.

Improper Markush

2. Prior to setting forth the restriction requirement, it is pointed out that applicants have presented instant claims in improper Markush format, see *Ex parte Markush*, 1925 C.D. 126, *In re Weber*, 198 USPQ 334 and MPEP 803.02 and 806.04. The claims are improperly set forth as the genus claims encompass multiple products, as identified and claimed, and fail to share the characteristics of a genus, i.e., a common utility and a substantial structural feature essential to the disclosed utility. Alternatively, the claims define multiple structurally distinct compounds capable of different use, with different modes of operation, different function and different effects. A reference against one of the claimed components or methods would not be a reference against the other. Therefore, the restriction will be set forth for each of the various groups, irrespective of the improper format of the claims, because the claims define inventions which are not proper species.

3. Restriction to one of the following inventions is required under 35 U.S.C. 121:

- I. Claims 1-4, 16-18, 20 in part drawn to an antagonist, classified for example in class 530, subclass 300.
- II. Claim 5 in part drawn to the use of an antagonist of one or more Rho family members to promote neural growth, classified for example in class 536, subclass 23.1.
- III. Claim 6 in part drawn to the use of ADP-ribosyl transferase C3 to promote neural growth, classified for example in class 435, subclass 7.1.
- IV. Claim 7 in part drawn to the use of GTPase activating protein specific to Rho to convert

Art Unit: 1647

GTP-bound active Rho to GDP-bound inactive Rho, classified for example in class 435, subclass 5.

V. Claim 8 in part drawn to use of related toxin A, classified for example in class 424, subclass 184.1.

VI. Claim 8 in part drawn to use of related toxin B, classified for example in class 424, subclass 184.1.

VII. Claim 9 drawn to the use of ADP-ribosyl transferase C3 analogs to promote neural, classified for example in class 514, subclass 2.

VIII. Claim 10 drawn to the use of Y27632 to promote neural growth, classified for example in class 435, subclass 6.

IX. Claim 11, 13 in part drawn to the use of genetically mutated Rho to promote neural growth, classified for example in class 435, subclass 5.

X. Claim 12 drawn to the use of dominant negative Rho, classified for example in class 435, subclass 6.

XI. Claim 14, drawn to the use of GDP dissociation inhibitors, classified for example in class 424, subclass 184.1.

XII. Claim 15 in part drawn to a method for producing Rho antagonists comprising exposing to candidate members, classified for example in class 436, subclass 536.

XIII. Claim 19 in part drawn to an assay to identify Rho family member antagonists, classified for example in class 436, subclass 536.

XIV. Claim 21 in part drawn to a method to suppress the inhibition of neuron comprising delivering Rho antagonist, classified for example in class 514, subclass 44.

Art Unit: 1647

4. The inventions are distinct, each from the other because of the following reasons:

5. Invention I is related as multiple products. The products are distinct each from the other as the products differ in structure and function. In particular nucleic acids, peptides, antibodies, organic and inorganic molecules.

6. Inventions II-XIV are related as processes. The processes are distinct each from the other as the processes differ in reagents, steps, functions and effects.

7. Inventions I and II-XIV are related as products and processes of use. The inventions can be shown to be distinct if either or both of the following can be shown: (1) the process for using the product as claimed can be practiced with another materially different product or (2) the product as claimed can be used in a materially different process of using that product (MPEP § 806.05(h)). In the instant case the processes for using the nucleic acids, peptides, antibodies, organic and inorganic molecules can be practiced with alternative nucleic acids, peptides, antibodies, organic and inorganic molecules, and the products as claimed can be used alternatively in a method of treatment, a method of making antibodies, a method of screening compounds, and a method for detecting compositions.

8. Although there are no provisions under the section for "Relationship of Inventions" in MPEP 806.05 for inventive groups that are directed to different products, restriction is deemed to be proper because the products constitute patentably distinct inventions for the following reasons. Each of the antagonists represents unique molecules possibly composed of nucleic acids, polypeptides, antibodies, organic and inorganic molecule and has a unique structural feature which requires a unique search of the prior art. The inventions indicated differ in structure and function as they are composed of divergent compounds and are differentially able

Art Unit: 1647

to hybridize, bind or mediate biological functions. A reference to one element would not constitute a reference to another. In addition, searching all of the molecules in a single patent application would provide an undue search burden on the examiner and the USPTO's resources because the indicated searches are not co-extensive.

9. Because these inventions are distinct for the reasons given above and have acquired a separate status in the art as shown by their different classification, restriction for examination purposes as indicated is proper.

10. Because these inventions are distinct for the reasons given above and the search required for any Group is not required for any other Group, restriction for examination purposes as indicated is proper.

11. Because these inventions are distinct for the reasons given above and have acquired a separate status in the art because of their recognized divergent subject matter, restriction for examination purposes as indicated is proper.

12. Applicant is advised that the reply to this requirement to be complete must include an election of the invention to be examined even though the requirement be traversed (37 CFR 1.143).

13. This application contains claims directed to the following patentably distinct species of the claimed invention:

Rho family members selected from A) Rho A, B) Rho B, C) Rho C, D) Rac, E) cdc42, and F) Rho-associated protein kinase.

GTP/GDP interaction involving; A) GTP/GDP exchange proteins, B) GDP dissociation inhibitors, and C) GTPase activating protein.

Applicant is required under 35 U.S.C. 121 to elect a single disclosed species for each of the groups of Rho family members and GTP/GDP interactions for prosecution on the merits to which the claims shall be restricted if no generic claim is finally held to be allowable. Currently, claim 1, 5-6, 9, 11, 15, 17, and 19-21 are generic.

Applicant is advised that a reply to this requirement must include an identification of the species that is elected consonant with this requirement, and a listing of all claims readable thereon, including any claims subsequently added. An argument that a claim is allowable or that all claims are generic is considered nonresponsive unless accompanied by an election.

Upon the allowance of a generic claim, applicant will be entitled to consideration of claims to additional species which are written in dependent form or otherwise include all the limitations of an allowed generic claim as provided by 37 CFR 1.141. If claims are added after the election, applicant must indicate which are readable upon the elected species. MPEP § 809.02(a).

Should applicant traverse on the ground that the species are not patentably distinct, applicant should submit evidence or identify such evidence now of record showing the species to be obvious variants or clearly admit on the record that this is the case. In either instance, if the examiner finds one of the inventions unpatentable over the prior art, the evidence or admission may be used in a rejection under 35 U.S.C. 103(a) of the other invention.

14. Applicant is reminded that upon the cancellation of claims to a non-elected invention, the inventorship must be amended in compliance with 37 CFR 1.48(b) if one or more of the currently named inventors is no longer an inventor of at least one claim remaining in the application. Any amendment of inventorship must be accompanied by a petition under 37

Art Unit: 1647

CFR 1.48(b) and by the fee required under 37 CFR 1.17(i).

15. Any inquiry of a general nature or relating to the status of this general application should be directed to the Group receptionist whose telephone number is (703) 308-0196.

Papers relating to this application may be submitted to Technology Center 1600, Group 1640 by facsimile transmission. The faxing of such papers must conform with the notice published in the Official Gazette, 1096 OG 30 (November 15, 1989). Should applicant wish to FAX a response, the current FAX number for Group 1600 is (703) 308-4242.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Sharon L. Turner, Ph.D. whose telephone number is (703) 308-0056. The examiner can normally be reached on Monday-Thursday from 8:00 AM to 6:30 PM. If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Gary Kunz, can be reached at (703) 308-4623.



Sharon L. Turner, Ph.D.

October 31, 2003